REMARKS

The Non-Final Office Action, mailed July 18, 2008, considered claims 1, 3, 9, 11-13, 22, 24-27, 29 and 35. Claims 1-3 were rejected under 35 U.S.C. § 103(a) as being unpatentable over Rodriguez et al., U.S. Pub. No. 2002/0009149 in view of Brooks, U.S. Patent No. 7,143,432. Claims 9, 11-13, 22, 24-27, and 29 were rejected under 35 U.S.C. § 103(a) as being unpatentable over Brooks et al., US 7,143,432 in view of Rodriguez et al., US 2002/0009149. Claim 35 was rejected under 35 U.S.C. § 103(a) as being unpatentable over Brooks et al., US 7,143,432 in view of Rodriguez et al., US 2002/0009149, and further in view of Aharoni et al., US 6,014,694.

By this response, claims 1, 9, 11, 13, 22, 24, 26, and 27 are amended, while claim 35 is canceled. Claims 1, 3, 9, 11-13, 22, 24-27, and 29 remain pending of which claims 1, 9, 22, and 27 are independent.

The present invention is directed generally towards methods and corresponding computer program products for displaying an MPEG video stream when the stream is subject to bandwidth constraints or memory limitations. The invention provides a way for *the client* to monitor bandwidth and memory constraints, and when necessary specify that key frames rather than the full stream be sent. By requesting that the server transmit only specified key frames of an MPEG stream, the client can receive and display a video stream that would otherwise be suppressed. By this response, each of the independent claims has been amended to clarify that the client, not the server, determines when the server sends only key frames. The claims have also been amended to emphasize that this determination occurs during the streaming of the video. The claims have further been amended to specify that a second video stream is selected when the client determines that the bandwidth or memory resources are insufficient to receive the key frames of the first version.

Each of the claims was rejected over the references as detailed above. In view of the current amendments, however, Applicant submits that these references fail to teach or suggest each limitation of the independent claims.

Although both the Brooks and the Aharoni references address sending selected frames of a video stream depending on bandwidth capabilities, in each reference, the determination of whether to send selected frames is performed by the server rather than the client. For example, in Brooks, the gateway system determines bandwidth requirements. *See* Fig. 1; Col. 10, lines 43-44. This determination may be based on the type of device that is requesting data. *See* Col. 10, lines 11-24. The device may also specify maximum values for the video stream. *See* Col. 9, line 62 – Col. 10, line

10. However, in Brooks, neither the client nor the server determines that the bandwidth is insufficient to support a currently streamed video. To the contrary, the specified parameters are used only to initially select a video format rather than to update the format during the streaming of the video. Therefore, Brooks fails to teach or suggest each limitation of the independent claims.

Aharoni, on the other hand, does disclose that the compression level of the stream may be updated during streaming of the video, if the connection bandwidth cannot support a current compression level. *See* Col. 10, lines 34-49 (describing each GOP as having a different combination of Key, P, and B frames) and Col. 12, lines 6-9 (describing the selection of a new level of compression based on bandwidth requirements). In Aharoni, however, the determination of whether to update the compression level or the GOP is made by the server, not the client. This is done by monitoring packet acknowledgements that are sent by the client each time the client receives a packet. *See* Col. 13 through Col. 17 (describing network bandwidth measurement process). Because the only role a client plays in determining bandwidth capacity is by sending acknowledgements, and because a client only sends acknowledgments in response to the server sending a packet, the client has no way of specifying that only key frames be sent. This determination is made exclusively by the server. *See, e.g.* Col. 16, lines 34-39. Therefore, Aharoni fails to teach or suggest each limitation of the independent claims.

The importance of having the client specify the transmission of only key frames can best be seen in the case when key frames are requested based on memory limitations. If the server is making the determination, it would have no way of knowing that the client is unable to process the stream due to memory constraints. In such a case, if the bandwidth is sufficient for the stream, but the system is incapable of processing the stream due to memory limitations, the client would have no way of informing the server of this limitation based on the teachings of Brooks and Aharoni. However, in the present invention, because the client directly controls whether key frames are sent, the client may detect the memory limitation and instruct the server to send key frames accordingly.

Finally, because Rodriguez's disclosure is limited to the selective decoding of key frames rather than the transmission of key frames over the network, it fails to teach or suggest the limitations of the independent claims.

In view of the foregoing, Applicant respectfully submits that all the rejections to the independent claims are now moot and that the independent claims are now allowable over the cited art, such that any of the remaining rejections and assertions made, particularly with respect to all of

the dependent claims, do not need to be addressed individually at this time. It will be appreciated, however, that this should not be construed as Applicant acquiescing to any of the purported teachings or assertions made in the last action regarding the cited art or the pending application, including any official notice, and particularly with regard to the dependent claims.[1]

In the event that the Examiner finds remaining impediment to a prompt allowance of this application that may be clarified through a telephone interview, the Examiner is requested to contact the undersigned attorney at 801-533-9800.

The Commissioner is hereby authorized to charge payment of any of the following fees that may be applicable to this communication, or credit any overpayment, to Deposit Account No. 23-3178: (1) any filing fees required under 37 CFR § 1.16; (2) any patent application and reexamination processing fees under 37 CFR § 1.17; and/or (3) any post issuance fees under 37 CFR § 1.20. In addition, if any additional extension of time is required, which has not otherwise been requested, please consider this a petition therefore and charge any additional fees that may be required to Deposit Account No. 23-3178.

Dated this 8th day of October, 2008.

Respectfully submitted,

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[1] Instead, Applicant reserves the right to challenge any of the purported teachings or assertions made in the last action at any appropriate time in the future, should the need arise. Furthermore, to the extent that the Examiner has relied on any Official Notice, explicitly or implicitly, Applicant specifically requests that the Examiner provide references supporting any official notice taken. Furthermore, although the prior art status of the cited art is not being challenged at this time, Applicant reserves the right to challenge the prior art status of the cited art at any appropriate time, should it arise. Accordingly, any arguments and amendments made herein should not be construed as acquiescing to any prior art status of the cited art.